



**Commercial Real Estate  
Energy Alliance**

# Join the Commercial Real Estate Energy Alliance

## **Current CREEA Steering Committee Members include:**

- CB Richard Ellis
- Cushman & Wakefield
- Grubb & Ellis
- Hilton Hotels Corporation
- Jones Lang LaSalle
- MGM Mirage
- The Walt Disney Company
- Transwestern
- U.S. General Services Administration
- USAA Real Estate Company
- Wyndham Hotels and Resorts
- American Hotel and Lodging Association
- American Society of Heating, Refrigerating and Air-Conditioning Engineers
- Building Owners and Managers Association
- International Council of Shopping Centers
- National Association of Industrial and Office Properties
- Real Estate Roundtable

*The U.S. Department of Energy is inviting commercial real estate organizations to join the new Commercial Real Estate Energy Alliance (CREEA). CREEA is designed to promote the construction of high-performance buildings to reduce the energy consumption and carbon footprint of the commercial real estate market. The Department of Energy is acting as facilitator to bring these organizations together.*

**W**ith each passing year, those connected to the nation's commercial real estate market—building owners, tenants, and property representatives—have increasing concerns about energy reliability, price volatility, and the potential impact of greenhouse gas reduction policies on profitability. As a result, many in the commercial real estate sector are seeking innovative, high-performance solutions to dramatically reduce energy expenses, environmental costs, greenhouse gases, and overall operating risk.

This increased focus on energy efficiency and environmental impact has been matched by a wave of new green technologies that promise to meet the commercial real estate sector's desire for a quantum leap in the sustainability and energy performance of their buildings and businesses. But many of these technologies may be unproven, pose significant operational integration challenges, or are too costly at current prices to meet developers' and tenants' expectations.

The Commercial Real Estate Energy Alliance (CREEA) aspires to address these issues to meet and exceed the sector's high-performance demand.

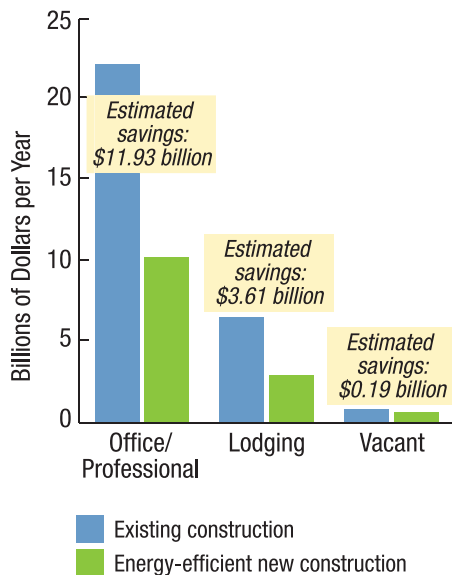
## **CREEA works with its members to:**

- Provide real-time access to advanced technologies and analytical tools emerging from DOE and the national energy laboratories.
- Create and share successful, evidence-based strategies for integrating advanced, high-performance technologies or processes in their facilities.
- Serve as a consistent, compelling voice to national manufacturers and distributors in response to the demand for highly efficient products and services in the commercial real estate sector.
- Provide greater consistency in energy-efficiency program design and delivery.
- Help DOE shape the future of technology research and development by clarifying the business needs unique to the commercial real estate sector.
- Validate the commercial real estate sector's energy and carbon reduction efforts to internal and external audiences, including prospective tenants and buyers and the financial community.
- Significantly increase commercial real estate's energy efficiency, which will also reduce greenhouse gases.
- Lower the cost of technologies and overcome regulatory barriers.

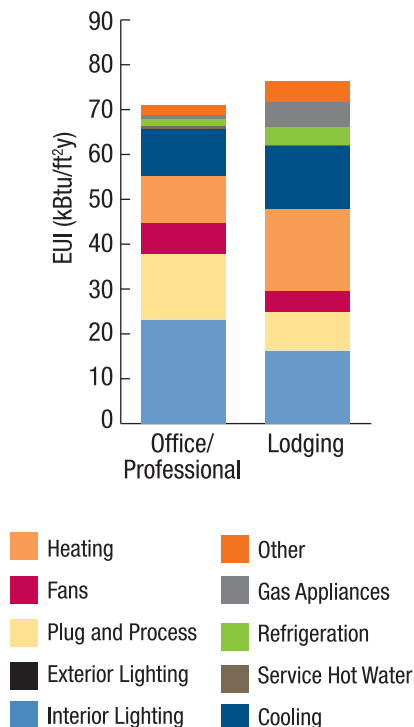


*The Porter Square Shopping Center, in Cambridge, Massachusetts, was renovated using environmentally sustainable real estate practices. In line with its "green bible" approach, the developer, Gravestarr, asked Applied Power Corporation to design and install a 20kW roof-mounted PV system, which produces enough electricity to power nearly all of the common areas of the strip center portion of the plaza.*

Estimated Annual Energy Costs  
of Commercial Real Estate Subsectors



Site Energy Consumption of Commercial  
Real Estate Subsectors (quads/y, %)



## Benefits of Joining CREEA

CREEA offers the opportunity to collaborate with the nation's premier building scientists and most prestigious commercial real estate companies on strategies to advance energy efficiency in commercial real estate buildings. For developers, it's a way to stand out in this highly competitive market—cultivating a “green” corporate image, attracting high-quality tenants, and generating solid returns. For tenants, it's a highly productive and cost-effective operational environment as well as an appealing way to support energy sustainability.

### As a CREEA member,\* you will be asked to:

- Participate in two CREEA meetings per year to establish objectives and direction, as well as one subcommittee call per month.
- Help establish commercial real estate building performance benchmarks by gathering and sharing your energy, equipment, and building data.\*
- Share your best energy-efficiency practices in building design, operation, and maintenance.
- Offer your input on future equipment purchases for new construction and retrofits, giving manufacturers incentive to develop higher-efficiency equipment based on potential market scale.
- Participate in scheduled equipment tests to determine real-world performance.
- Explore recommended variations to system designs based on geographical locations.

North-facing clerestory windows and white ceiling of the Cambria Building in Ebensburg, Pennsylvania, provide daylight to the second-floor office area. This energy-efficient building was designed to have as little impact on the surrounding environment as possible, and designers carefully considered the most appropriate building materials and systems available. By applying a concept called “integrated design,” they evaluated and minimized energy use and pollution created by the production of the materials used, reducing what the Cambria Building will generate throughout its lifetime.

## Energy Facts and Figures

- Commercial buildings produce an estimated 1.05 billion metric tons of carbon dioxide per year.
- Today, the commercial sector consumes an estimated 18 quads of energy annually.
- The U.S. has around 5 million commercial buildings, comprising more than 75 billion square feet of floor space.
- The value of new commercial construction in 2006 was just over \$300 billion and \$190 billion was spent on building renovations and repairs.
- In 2004, total commercial energy consumption was 57 percent higher than in 1985.
- The growth in buildings energy consumption has resulted in carbon dioxide emissions from buildings rising from about a third of total U.S. emissions in 1980 to almost 40 percent by 2005.
- Buildings account for 72 percent of U.S. electricity use and 55 percent of natural gas use.



Energy Efficiency &  
Renewable Energy

## Commercial Real Estate Energy Alliance

\*No proprietary information will be shared without permission.

To learn more about CREEA, contact:

**Dru Crawley**  
Building Technologies Program  
Energy Efficiency and Renewable Energy  
U S Department of Energy  
[Drury.Crawley@ee.doe.gov](mailto:Drury.Crawley@ee.doe.gov)  
[buildings.energy.gov/real\\_estate](http://buildings.energy.gov/real_estate)